ABSTRACT OF THE DISCLOSURE

Rhenium-188 labeled particles are produced by suspending particles of an organic polymer or a biopolymer in a solution wherein the solution contains a water-soluble tin-II salt and a Re-188 perrhenate salt with a radioactivity of 1,000 MBq to 60,000 MBq and wherein the solution has initially a pH value of pH 1 to pH 3; heating the solution of step a) to 80 °C to 100 °C; and, after 45 minutes to 70 minutes of heating, increasing and adjusting the pH value to a pH value of pH 5 to pH 8.5.